



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
-----------------	-------------	----------------------	---------------------	------------------

10/500,904

02/11/2005

Philippe Vincent

12400-015

1396

757 7590 03/17/2008
BRINKS HOFER GILSON & LIONE
P.O. BOX 10395
CHICAGO, IL 60610

EXAMINER

CULBRETH, ERIC D

ART UNIT

PAPER NUMBER

3616

MAIL DATE

DELIVERY MODE

03/17/2008

PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary	Application No. 10/500,904	Applicant(s) VINCENT ET AL.	
	Examiner Eric Culbreth	Art Unit 3616	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 25 October 2007.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1 and 3-18 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1 and 3-18 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 25 October 2007 is/are: a) ☐ accepted or b) ☒ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____ |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

Response to Amendment

1. In the amendment filed 10/25/07, confusion exists over the status of claim 2. The claim identifier states that claim 2 is "withdrawn"; however, this is a status for a claim drawn to a nonelected species or invention, and there has been no restriction requirement in this application. Apparently, it is meant that the claim is canceled. The claim will be treated as canceled in this action and should be properly identified in applicant's next correspondence.

Drawings

2. The drawings were received on 10/25/07. These drawings are not approved because the exact location of the weight sensor as at the center of the seat bottom is new matter (there is no support in the original disclosure for the location of the weight sensor). It is not necessary to resubmit the drawings; rather, if paragraph 45 were amended to recite that the sensor is a "schematic" representation or showing (for illustrative purposes only), the drawing would be approved.

3. The drawings are objected to under 37 CFR 1.83(a). The drawings must show every feature of the invention specified in the claims. Therefore, the weight sensor of claim 5 must be shown or the feature(s) canceled from the claim(s). No new matter should be entered.

Corrected drawing sheets in compliance with 37 CFR 1.121(d) are required in reply to the Office action to avoid abandonment of the application. Any amended replacement drawing sheet should include all of the figures appearing on the immediate prior version of the sheet, even if only one figure is being amended. The figure or figure number of an amended drawing should not be labeled as “amended.” If a drawing figure is to be canceled, the appropriate figure must be removed from the replacement sheet, and where necessary, the remaining figures must be renumbered and appropriate changes made to the brief description of the several views of the drawings for consistency. Additional replacement sheets may be necessary to show the renumbering of the remaining figures. Each drawing sheet submitted after the filing date of an application must be labeled in the top margin as either “Replacement Sheet” or “New Sheet” pursuant to 37 CFR 1.121(d). If the changes are not accepted by the examiner, the applicant will be notified and informed of any required corrective action in the next Office action. The objection to the drawings will not be held in abeyance.

Because the drawings were not approved the objection remains.

4. The drawings are objected to because of the following informalities. Corrected drawing sheets in compliance with 37 CFR 1.121(d) are required in reply to the Office action to avoid abandonment of the application. Any amended replacement drawing sheet should include all of the figures appearing on the immediate prior version of the sheet, even if only one figure is being amended. The figure or figure number of an amended drawing should not be labeled as “amended.” If a drawing figure is to be

canceled, the appropriate figure must be removed from the replacement sheet, and where necessary, the remaining figures must be renumbered and appropriate changes made to the brief description of the several views of the drawings for consistency.

Additional replacement sheets may be necessary to show the renumbering of the remaining figures. Each drawing sheet submitted after the filing date of an application must be labeled in the top margin as either "Replacement Sheet" or "New Sheet" pursuant to 37 CFR 1.121(d). If the changes are not accepted by the examiner, the applicant will be notified and informed of any required corrective action in the next Office action. The objection to the drawings will not be held in abeyance.

- a. Regarding Figure 2, the lead line for reference numeral 2 should touch the track or have an arrow (note paragraph [0037]).
- b. Contrary to paragraph [0037], line 4, the lead line for reference numeral 26 in the replacement drawing of 7/2/04 does not touch an inwardly directed lip.
- c. Regarding paragraph [0043], lines 4-5 controller 42 is not illustrated as connected to inter-face 43 in Figure 3.
- d. Regarding paragraph [0045], next to last line, reference numeral 62's lead line does not touch the squib.

Because the proposed replacement sheets were not approved the objections remain.

Claim Rejections - 35 USC § 103

5. The text of those sections of Title 35, U.S. Code not included in this action can be found in a prior Office action.

6. Claims 1, 3-4, 6-7 and 14-18 are rejected under 35 U.S.C. 103(a) as being unpatentable over UK Patent 2,327,914 (cited by applicant) in view of Hawes et al US005838233A (of record).

UK '914 discloses a safety arrangement in a motor vehicle comprising a removably mounted seat 1 (page 18, second paragraph) having a safety device 4 (a pretensioner or airbag in the next to last line of the abstract, regarding claim 3) adapted to be actuated in the event that an accident should occur, and a wireless first communication channel having a first part (antennas 9) on the vehicle rails (claim 18) and a second part (antennas 10) on the vehicle seat. The first communication channel includes a first system for providing a first signal to a control unit (generator 12) when the seat is present in the vehicle (lines 4-5 of the abstract, where there are means or a system to supply a signal to a transmitting antenna on the seat, which would involve the generator 12, which is the control unit). It would have been obvious to one of ordinary skill in the art at the time the invention was made to modify UK '914 to include a second system for determining the presence of the seat in the vehicle and providing a signal indicative of the presence of the seat in the vehicle to the control unit as taught by Hawes et al's tags 30 and 34 with different frequencies (column 2, lines 53-56) in order to give a redundant positive indication of the presence and orientation of the seat (column 3, lines 55-61) (claim 1). In the combination Hawes et al's inductor 62 and tags

Art Unit: 3616

30, 34 would be the third and fourth parts claimed in claim 1. The safety device on the seat in Figure 8 of UK '914 has a diagnostic sensor 83 adapted to pass a signal to the control unit on the vehicle through the communication sensor (page 17, last paragraph, where coded signals are passed from the seat occupancy sensor to the seat modulator 84 and hence to the seat antennas 76 and on to the chassis antennas 72)(claim 4).

The second system in the combination is a transmitter (a tag/antenna) or active system transmitting a signal from the seat to the control unit through a second communication channel when interrogated or sensed (claim 6). In the combination Hawes et al's second system includes a passive arrangement including a sense element 30, 34 on the seat that defines the fourth part, a sensor 62 on the vehicle defining the third part, and a lead with node 82 connected to a control unit or detection circuit 42 and extending to the sensor 62, with the sensor configured to sense the sense element 30, 34 (claim 7). In UK '914, Figure 5, the communication channel includes inductive coils 9 and 16-18 (claim 14), and power is transferred from the vehicle to the seat through the coils (page 3, next to last paragraph)(claim 15). In Figure 8 of UK '914, charger 77 and capacitor 78 are a storage arrangement by which power may be stored in the seat when transferred (claim 16). In the combination, since Hawes et al teaches at column 3, lines 55-61 that the second tag 34 gives a positive indication of orientation of the seat for redundancy, and teaches at column 3, lines 33-36 that an alarm is activated if tags 30 and 34 indicate a dangerous situation, it would be obvious to the skilled artisan to include an alarm generator if only one of the systems indicates a seat (i.e., to set off an alarm at any sign of abnormality) (claim 17).

7. Claim 5 is rejected under 35 U.S.C. 103(a) as being unpatentable over UK '914 in view of Hawes et al as applied to claim 1 above, and further in view of Handman et al US5696409, cited by applicant.

It would have been obvious to one of ordinary skill in the art at the time the invention was made to modify UK '914 and Hawes et al to include a weight sensor in the seat in view of Handman et al's teaching at column 3, lines 32-37 to use a receiver system to transmit signals regarding the weight sensor along with signals regarding the pretensioner.

8. Claims 8-9 are rejected under 35 U.S.C. 103(a) as being unpatentable over UK '914 in view of Hawes et al as applied to claim 7 above, and further in view of Holzapfel et al US005804887A (cited by applicant).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to modify UK '914 and Hawes et al to include a switch engaged by the seat as the second system in view of Holzapfel et al's teaching at column 4, lines 40-45 of a mechanical switch activated when the seat is installed in order to use a manual, simple connection (claim 8) or to include the second system being a magnet and Hall effect or reed switch on the vehicle as taught by Holzapfel et al at column 4, lines 46-49 in order to use an alternative equivalent to the mechanical switch (claim 9).

9. Claims 10-13 are rejected under 35 U.S.C. 103(a) as being unpatentable over UK '914 in view of Hawes et al as applied to claim 7 above, and further in view of Meister et al (US005570903A, of record).

It would have been obvious to one of ordinary skill in the art at the time the invention was made to modify UK '914 and Hawes et al to include a light source illuminating a light responsive sensor or bar code on the seat in view of Meister et al's bar code 48 on the removable seat or reflector 42 on the seat in order to sense the presence of the seat using alternative equivalent structure in the art.

Response to Arguments

10. Applicant's arguments filed 10/25/07 have been fully considered but they are not persuasive.

11. In response to applicant's argument that Hawes et al's redundant tags must be near the reader, the test for obviousness is not whether the features of a secondary reference may be bodily incorporated into the structure of the primary reference; nor is it that the claimed invention must be expressly suggested in any one or all of the references. Rather, the test is what the combined teachings of the references would have suggested to those of ordinary skill in the art. See *In re Keller*, 642 F.2d 413, 208 USPQ 871 (CCPA 1981).

Including the second tag and inductor on the seat and rails (i.e., as additional antennae) would be a mere shifting of parts and yield predictable results.

In regard to applicant's remarks that neither UK '914 nor Hawes et al teach first, second, third and fourth parts as claimed, in the combination Hawes et al's redundant tag and inductor would be third and fourth parts in addition to UK '914's first and second parts.

Conclusion

12. **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Eric Culbreth whose telephone number is 571/272-6668. The examiner can normally be reached on Monday-Thursday, 9:00-6:30.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Paul Dickson can be reached on 571/272-6669. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Art Unit: 3616

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

Eric Culbreth
Primary Examiner
Art Unit 3616

/Eric Culbreth/
Primary Examiner, Art Unit 3616